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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/757,488	01/15/2004	Lior Goldenberg	27067	4156
7590 09/27/2005			EXAMINER	
G.E. EHRLICH (1995) LTD. c/o ANTHONY CASTORINA SUITE 207 2001 JEFFERSON DAVIS HIGHWAY ARLINGTON, VA 22202			KIM, AHSHIK	
			ART UNIT	PAPER NUMBER
			2876	

DATE MAILED: 09/27/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

AK

Office Action Summary	Application No. 10/757,488	Applicant(s) GOLDENBERG, LIOR	
	Examiner Ahshik Kim	Art Unit 2876	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 1/15/04 (initial filing of application).
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-75 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-75 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 15 January 2004 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION***Drawings***

1. This application is filed with informal drawings which are acceptable for examination purposes only. Formal drawings will be required in response to this Office Action or when the application is allowed. Also, Applicant is respectfully reminded that the items in the drawings can be labeled, if it were to help disclosing the claimed invention.

Claim Rejections - 35 USC § 102

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

3. Claims 1-3, 5-23, 27-45, 47-62, and 64-75 are rejected under 35 U.S.C. 102(e) as being anticipated by Meunier et al. (US 6,820,815, hereinafter “Meunier”).

Re claims 1, 20-23, 42, 59-62, 65, and 67, Meunier discloses a method and the apparatus for identifying and processing substantially flat items (see abstract; col. 1, lines 18+) which can be stacked (see figure 2). The code reader reads the code marked on the edge of the stacked item (col. 2, lines 53+). The captured image can be outputted to the user, or be used in searching or indexing stored data on the computer system (col. 4, lines 40+). The substantially flat items are

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paper (col. 1, lines 18+). The typical edge thickness of the paper is 0.1 mm which is sufficient height to write a barcode (col. 6, lines 25+). Printing/writing on the sheets are considered image enhancement of the sheets.

Re claim 2, in reading the code, an edge reader may provide necessary light to the side of
5 the stacked items (col. 7, lines 54+).

Re claims 3, 5, 6, 13, 14, 29, 45, 47, 57, and 70, the marking can be done utilizing both visible and invisible ink (col. 6, lines 25-34; col. 6, line 66 – col. 7, line 8). The identification marking includes the rim identifier and a sheet identifier identifying individual sheets (col. 6, lines 66+). Accordingly, the sheets having different rim identifier would be distinguishable.

10 Re claims 7, 8 15-18, 33-37, 48, 49 54, 64, 69, 71, 72, and 75, as shown in figure 1, the stack has four edges, two sets of two oppositely facing edges. The rim identifier 14 situated on the long side of the stack, and sheet identifier 12 situated on a short side of the stack. Both codes take up certain lengths, and situated in certain positions (see figure 1). The rim can have a certain number of sheets, and a number of different rims can be stacked together. The two codes,
15 in certain perspective, are considered complementary in that both codes work together in identifying a sheet in the stack.

Re claims 9, 10, 30, 38, 39, 44, 50, 51, 66, 68, 73, and 74, the visible ink in normal lighting (col. 6, lines 25-34; col. 6, line 66 – col. 7, line 8) constitutes an illumination condition, and markings display a certain intensity under normal or lighted condition.

20 Re claims 12, 40, 41, and 52, the marking can be done with one-dimensional bar code (col. 7, lines 4+) or two-dimensional code (col. 10, line 58 – col. 11, line 7).

Re claim 27, 53 since the markings are on a side of a stack (see figure 2), the orientation of the stack can be described with respect to the markings. The rim identifier identifies that the rim, and it can be said that whether one particular sheet belongs to the rim.

Re claim 43, the sheets also can be counted for various accounting and indexing purposes
5 (col. 3, lines 20-35).

Re claim 58, each sheet in the stack can be located by calculating offset derived from the thickness of the sheets (col. 7, lines 9-41).

4. Claims 1, 25, and 26 are rejected under 35 U.S.C. 102(e) as being anticipated by Copham
10 (US 5,085,417, hereinafter "Copham").

Copham discloses a method of validating stacked substantially flat items – personal checks (see abstract; col. 1, lines 9+; col. 2, lines 25) wherein the stack has identifiable markings 66 on the edge (see figure 3) which is used to make sure that the order is correctly processed (col. 6, lines 28+). Although visual inspection of the code can be made, it is preferred that
15 barcode reader is used to ensure the correct capture of the data (col. 7, lines 39-47). Claim 1 can be rejected by either Meunier or Copham references. Since claims 25 and 26 are dependent claim of 1, claim 1 is again mentioned in this paragraph.

Claim Rejections - 35 USC § 103

20 5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person

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having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

6. Claims 4 and 46 are rejected under 35 U.S.C. 103(a) as being unpatentable over Meunier
5 et al. (US 6,820,815, hereinafter "Meunier").

The teachings of Meunier have been discussed above. Meunier further discloses that the portions of the code on the stack can be printed with visible and invisible ink (col. 6, lines 25-34). The invisible marking may be detected by the infrared detector (col. 9, lines 44+). Infrared and UV are well known medium that are beyond the visible spectrum. Visible lights are between
10 about 380 –700 nm ($\text{nm} = 10^{-9} \text{ m}$). Wavelength below 380 nm is UV; and wavelength above 700nm is IR. The IR or UV reacting marks become visible when they are applied with either IR or UV. It is the Examiner's view that one ordinary skill in the art who would use infrared can certainly use UV without undue experimentation. Also see the Soules patent for UV and IR disclosure.

15 7. Claims 24 and 63 are are rejected under 35 U.S.C. 103(a) as being unpatentable over Soules et al. (US 5,169,155, hereinafter Soules) in view of Meunier et al. (US 6,820,815).

Soules discloses a deck of playing cards wherein each card is marked with an identifying barcodes 56, 66, and 76 (see figures 5, 6 and 7; col. 1, lines 35+; col. 6, lines 41+; col. 11, lines 45+). Soules, however, fails to specifically teach or fairly suggest that the barcode is marked on
20 the edge of the card.

As discussed in paragraph 1 above, Meunier teaches a method and apparatus for marking identification code on the side of stacked thin/flat items, wherein each item and the whole stack as a whole, can be identified.

In view of Meunier's teaching, it would have been obvious to an ordinary skill in the art at the time the invention was made to apply the markings on the side of the playing cards so that the individual card can be identified from the side. With playing cards, it is well known practice to ensure that the deck is complete (52 cards) before any game is played. Spreading the card
5 deck or counting each card can be cumbersome and time-consuming. By reading the identification code marked on the side of the deck, such process can be automated, saving manpower and time. In case of casino embodiment, such automated process translates to more playing time for patrons and potentially more revenue for the house. Automated card shuffling machine is another similar example.

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Conclusion

I. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure: Biegelsen et al. (US 6,335,084 B1); Shigeta (US 2004/0026636); Jannersten (US 6,527,191); Weaver et al. (US 6,636,704); Soltys et al. (US 6,758,751) disclose methods and
15 apparatus for processing flat items. Applicant is respectfully suggested to carefully review these references.

II. Any inquiry concerning this communication or earlier communications from the examiner should be directed to *Ahshik Kim* whose telephone number is (571)272-2393. The examiner can normally be reached between the hours of 6:00AM to 3:00PM Monday thru
20 Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Michael G. Lee, can be reached on (571)272-2398. The fax number directly to the Examiner is (571)273-2393. The fax phone number for this Group is (703)872-9306.

Communications via Internet e-mail regarding this application, other than those under 35 U.S.C. 132 or which otherwise require a signature, may be used by the applicant and should be
25 addressed to [ahshik.kim@uspto.gov].

*All Internet e-mail communications will be made of record in the application file. PTO employees do not engage in Internet communications where there exists a possibility that sensitive information could be identified or exchanged unless the record includes a properly
30 signed express waiver of the confidentiality requirements of 35 U.S.C. 122. This is more clearly set forth in the Interim Internet Usage Policy published in the Official Gazette of the Patent and Trademark on February 25, 1997 at 1195 OG 89.*

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Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the Group receptionist whose telephone number is (703) 308-0956.



Ahshik Kim
Primary Examiner
Art Unit 2876
August 2, 2005

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